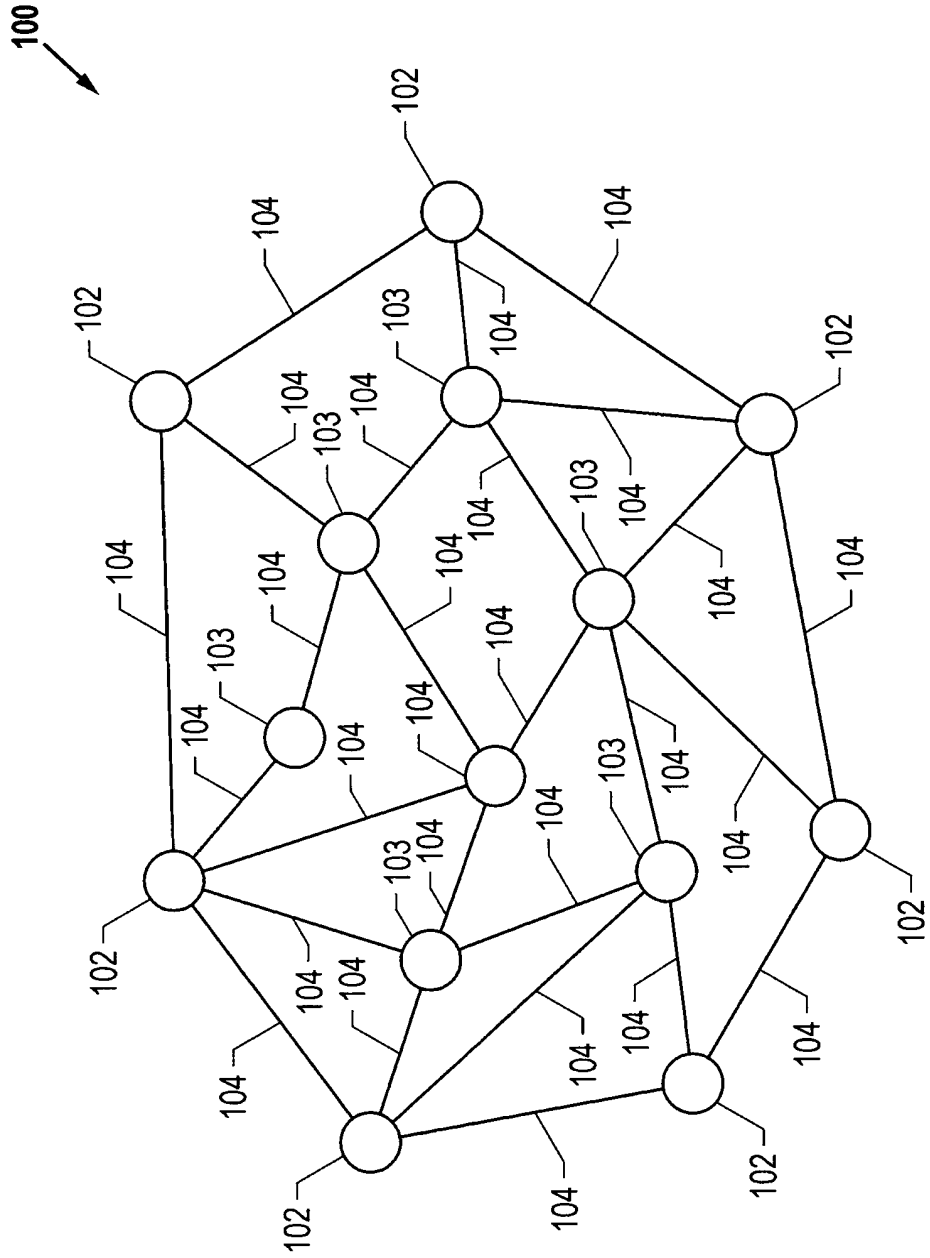

FIG. 1

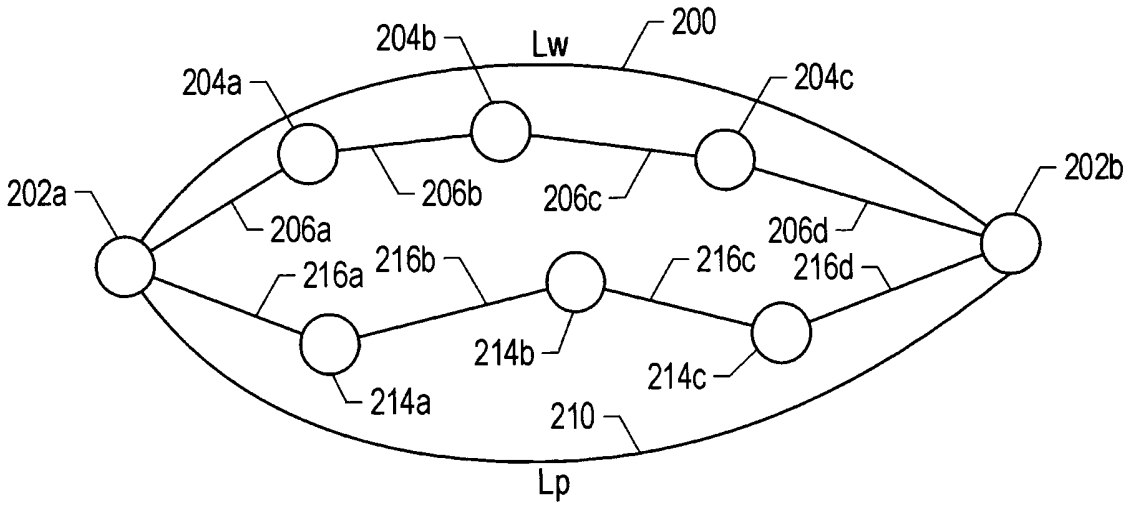
204b
Lw
200
204a
204c
202a
206b
206c
202b
206a
206d
216a
216b
216c
216d
214b
214c
214a
210
Lp

FIG. 2A

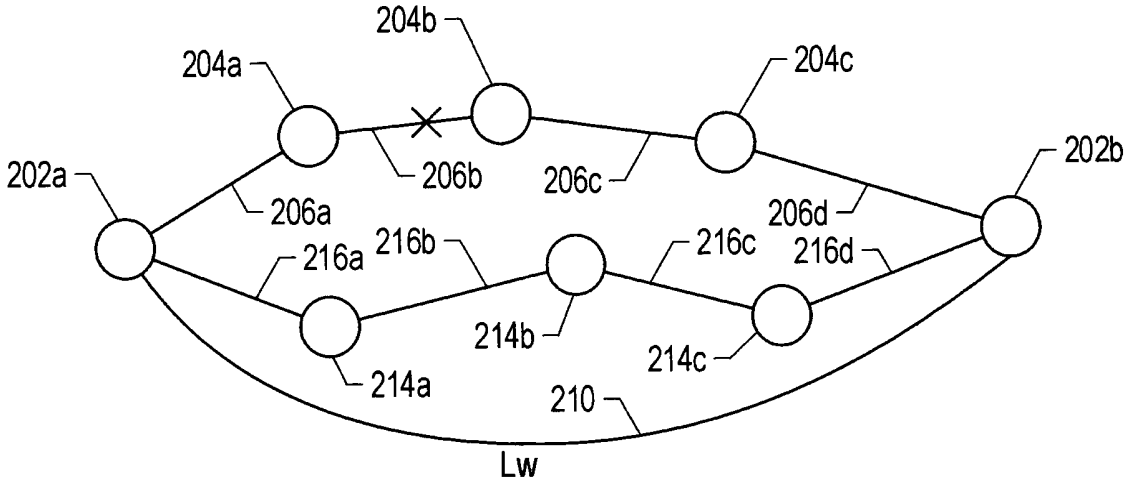
204b
204a
204c
202a
206b
206c
202b
206a
206d
216a
216b
216c
216d
214b
214c
214a
210
Lw

FIG. 2B

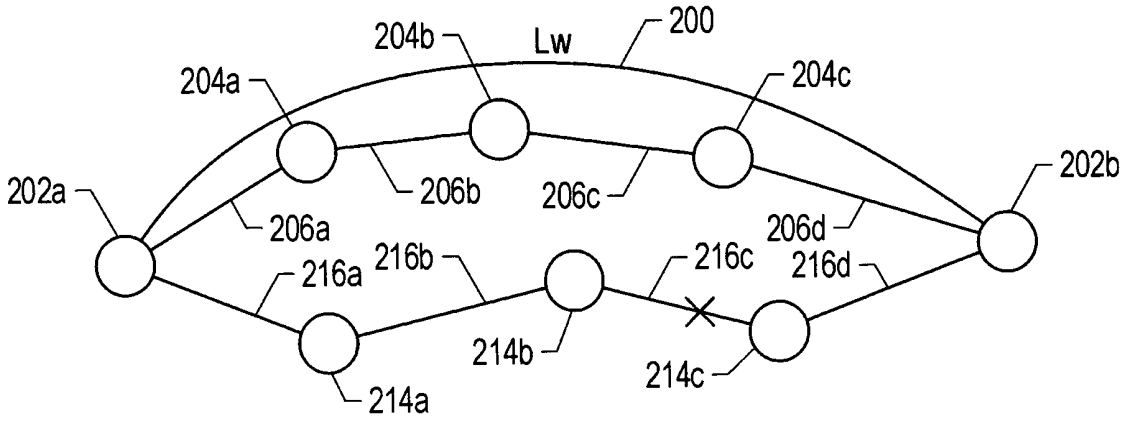
204b
Lw
200
204a
204c
202a
206b
206c
202b
206a
206d
216a
216b
216c
216d
214b
214c
214a

FIG. 2C

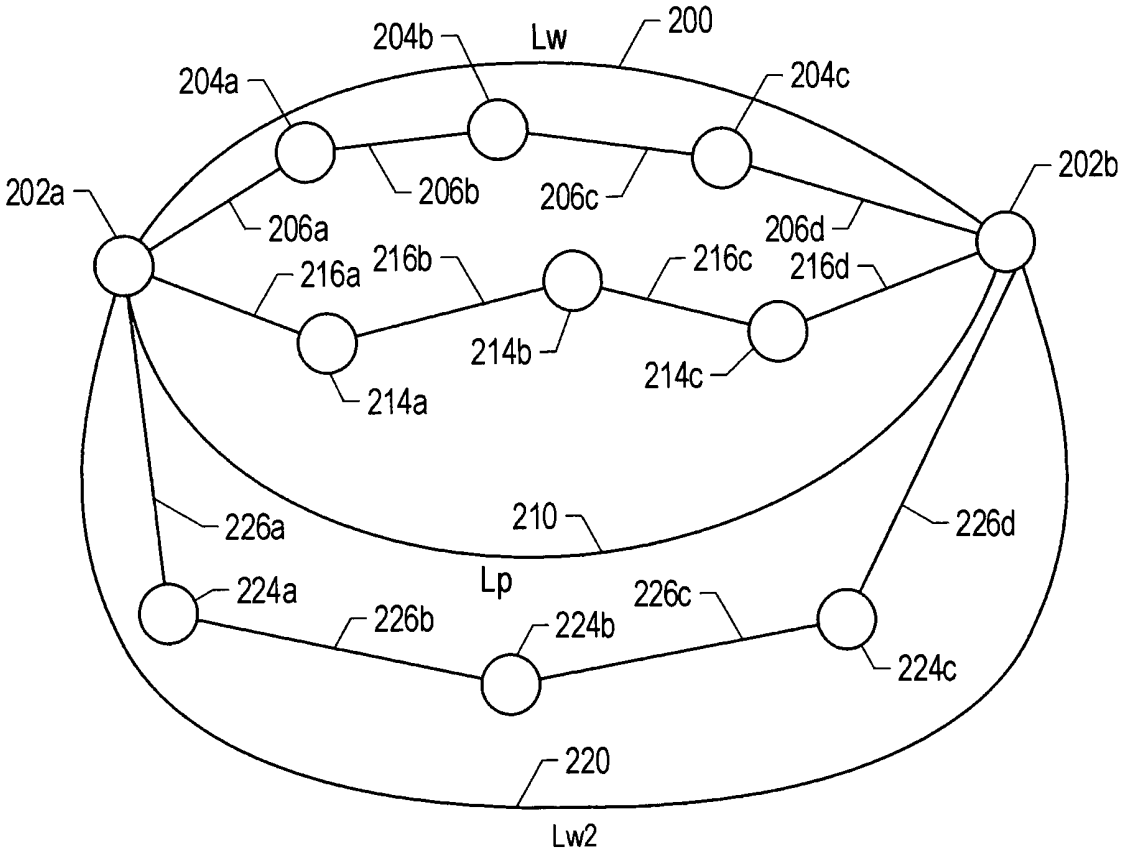
204b
Lw
200
204a
204c
202a
206b
206c
202b
206a
206d
216a
216b
216c
216d
214b
214c
214a
226a
210
226d
Lp
224a
226c
226b
224b
224c
220
Lw2

FIG. 2D

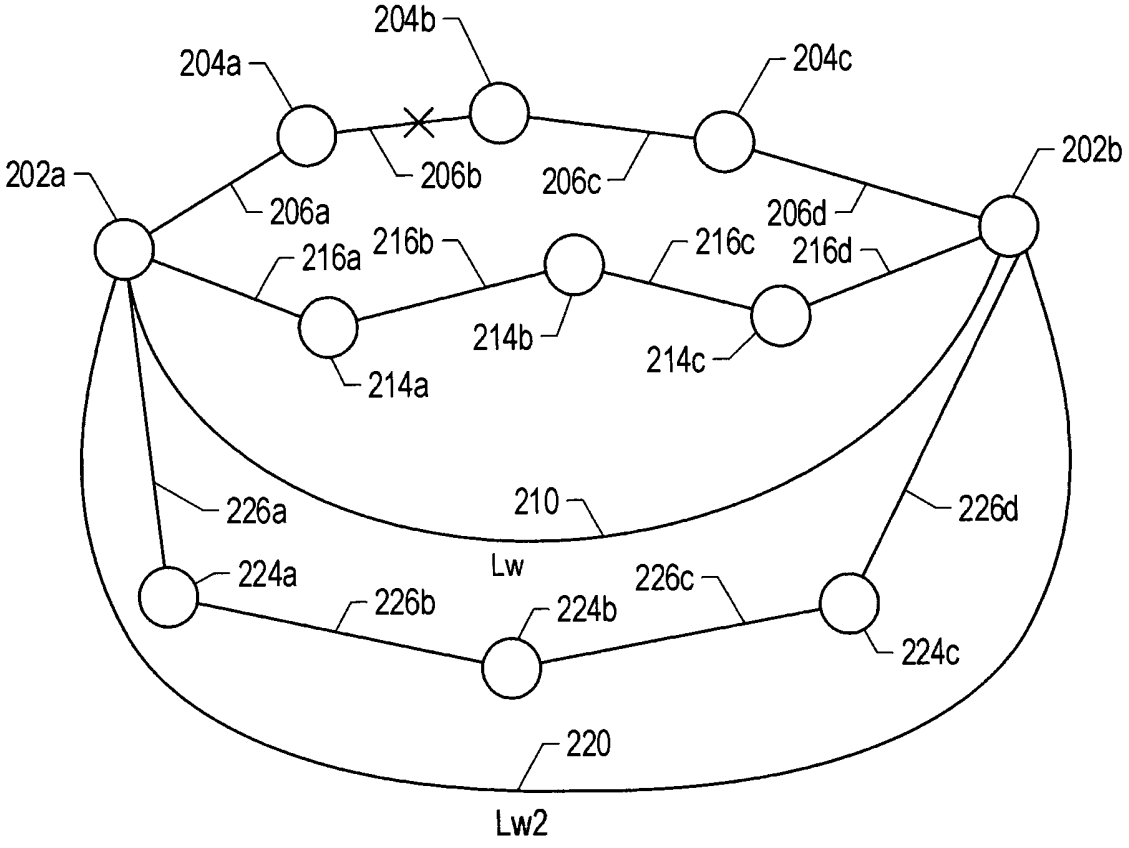
204b
204a
204c
202a
206b
206c
202b
206a
206d
216a
216b
216c
216d
214b
214a
214c
226a
210
226d
Lw
224a
226b
224b
226c
224c
220
Lw2

FIG. 2E

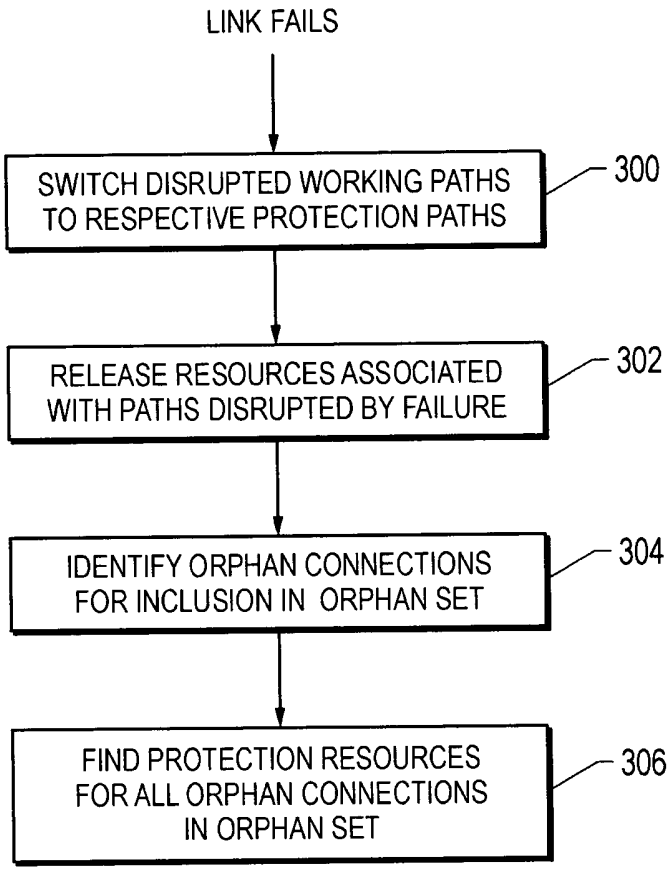
LINK FAILS
SWITCH DISRUPTED WORKING PATHS TO RESPECTIVE PROTECTION PATHS
300
RELEASE RESOURCES ASSOCIATED WITH PATHS DISRUPTED BY FAILURE
302
IDENTIFY ORPHAN CONNECTIONS FOR INCLUSION IN ORPHAN SET
304
FIND PROTECTION RESOURCES FOR ALL ORPHAN CONNECTIONS IN ORPHAN SET
306

FIG. 3

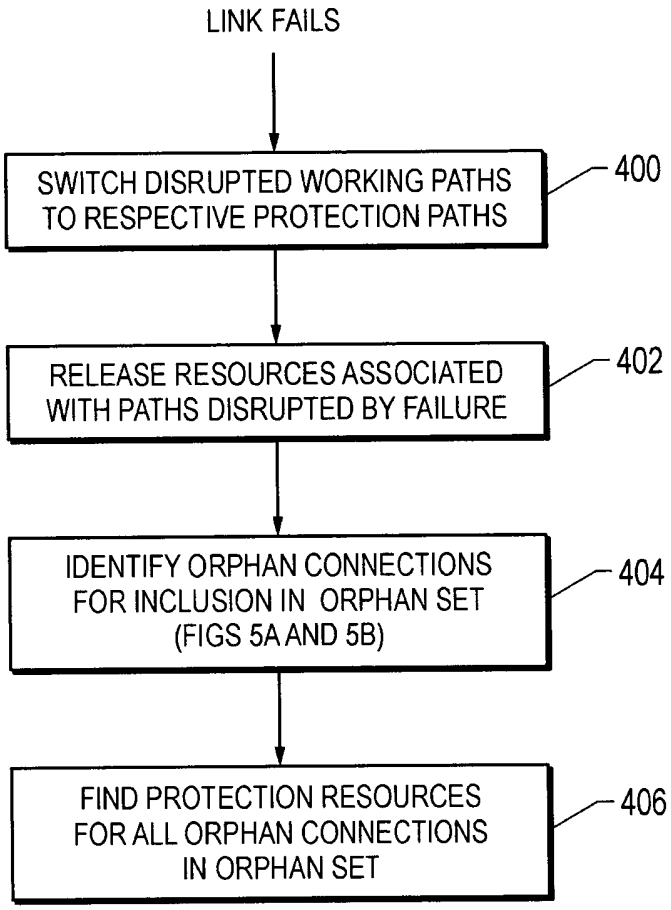
LINK FAILS
SWITCH DISRUPTED WORKING PATHS TO RESPECTIVE PROTECTION PATHS
400
RELEASE RESOURCES ASSOCIATED WITH PATHS DISRUPTED BY FAILURE
402
IDENTIFY ORPHAN CONNECTIONS FOR INCLUSION IN ORPHAN SET (FIGS 5A AND 5B)
404
FIND PROTECTION RESOURCES FOR ALL ORPHAN CONNECTIONS IN ORPHAN SET
406

FIG. 4

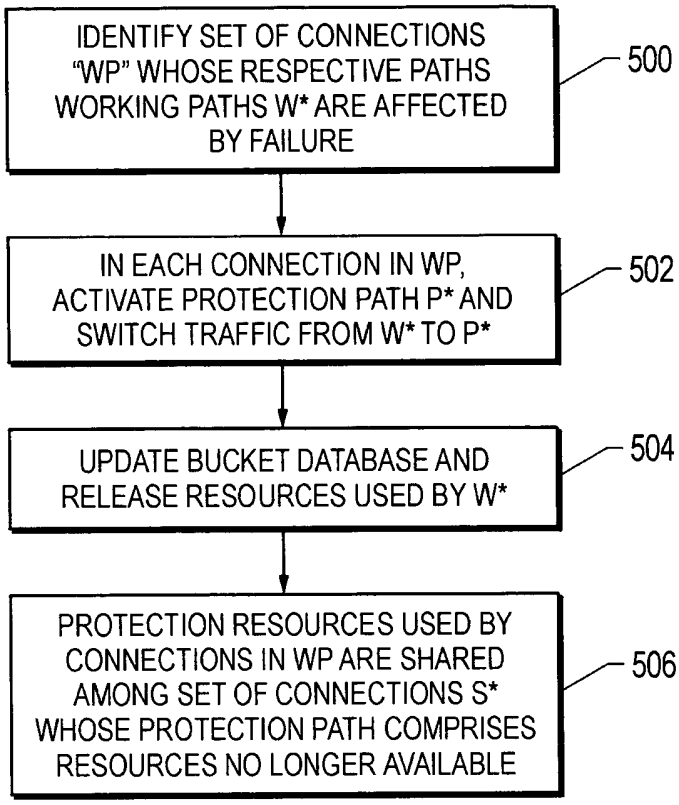
IDENTIFY SET OF CONNECTIONS "WP" WHOSE RESPECTIVE PATHS WORKING PATHS W* ARE AFFECTED BY FAILURE
500
IN EACH CONNECTION IN WP, ACTIVATE PROTECTION PATH P* AND SWITCH TRAFFIC FROM W* TO P*
502
UPDATE BUCKET DATABASE AND RELEASE RESOURCES USED BY W*
504
PROTECTION RESOURCES USED BY CONNECTIONS IN WP ARE SHARED AMONG SET OF CONNECTIONS S* WHOSE PROTECTION PATH COMPRISES RESOURCES NO LONGER AVAILABLE
506

FIG. 5A

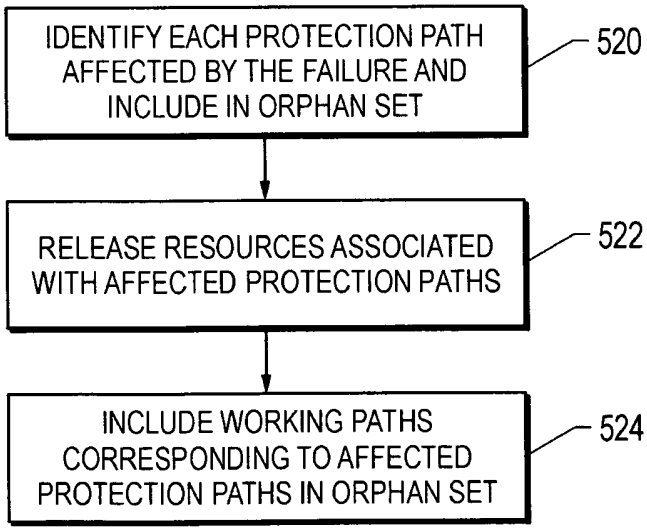
IDENTIFY EACH PROTECTION PATH AFFECTED BY THE FAILURE AND INCLUDE IN ORPHAN SET
520
RELEASE RESOURCES ASSOCIATED WITH AFFECTED PROTECTION PATHS
522
INCLUDE WORKING PATHS CORRESPONDING TO AFFECTED PROTECTION PATHS IN ORPHAN SET
524

FIG. 5B